SECTION E: STORMWATER MANAGEMENT SUB-ELEMENT

GOAL: Section 125.01, Florida Statutes provides general authority to the Board of County Commissioners (the "Board") to establish and provide for drainage programs. The goals of the Board relative to drainage and stormwater management are: reduce or eliminate existing flooding problems and prevent future flooding problems; protect surface waters from contamination and sedimentation caused by stormwater runoff; provide special protection for potable water sources; correct known deficiencies in the existing stormwater control network; prevent future problems by regulating the development and use of land, and; to promote and further the established policies and laws of the state relative to stormwater management and flood damage prevention.

Vision: We will develop efficient and effective infrastructure that promotes economic development and enhances the environment, quality of life, and aesthetics.

GENERAL STRATEGY

The general strategy for Stormwater Management involves a balanced program of regulations to prevent future problems, capital improvements and maintenance to correct existing problems, and structural controls to prevent flood damage. This strategy involves the following general concepts.

- Promote the implementation of the Strategic Plan for Stormwater System and the Master Storm Drainage Plan.
- Manage and continue to build the Cartegraph stormwater asset management system.
- Continue to correct existing DEP notices of violation.
- Continue the development of a three pronged maintenance-program consisting of the identification of drainage pipes, easements, and ditches, to maximize the utility of existing facilities.
- Use a basin approach to road and drainage improvements.
- Reduce duplicative regulations. To the maximum extend possible, the County shall adopt Northwest Florida Water Management District, the Department of Environmental Protection and the Florida Department of Transportation standards for the design and construction of drainage facilities.
- Establish general criteria in the Land Development Regulations for construction of stormwater treatment facilities.
- Maintain level of service standards for concurrency management purposes.
- Reduce the potential for flood-related damage through continued participation in the National Flood Insurance Program (NFIP).
- Protect surface waters from stormwater pollution.
- Promote a dedicated funding source for stormwater programs and projects.

Objective 5E.1: Use the *Strategic Plan for Stormwater System* as the basis for correcting known deficiencies and problems.

Public Purpose: Correct known stormwater problems and deficiencies [s.187.201(8), 373.016, F.S.].

Performance Measure: The extent to which identified storm-water improvement projects and programs are completed.

Policy 5E.1.1: The *Strategic Plan for Stormwater System* will serve as the guidance document for the County's stormwater management program. Continue to utilize and update the Stormwater Strategic Plan.

Objective 5E.2: Continue to utilize the *Master Storm Drainage Plan* as the means for completing long-range stormwater management strategies.

Public Purpose: Provide long-range planning strategies to reduce the discharge of untreated stormwater into waters of the state [s.187.201(8), 403.021, F.S.].

Performance Measure: The extent to which plans, programs and projects identified in the Plan are completed.

Policy 5E.2.1: The *Master Storm Drainage Plan* will be used in conjunction with the *Strategic Plan* to identify stormwater plans, programs and projects during the next 10 years.

Objective 5E.3: Continue to maintain the Cartegraph based stormwater management system.

Public Purpose: Provide an effective and efficient stormwater management system (s.403.0891, F.S).

Performance Measure: Whether or not the Cartegraph stormwater management system is utilized in identifying and correcting problem areas.

Policy 5E.3.1: Use the County's Cartegraph to monitor stormwater improvements; and operation and maintenance activities.

Objective 5E.4: Complete projects intended to correct the 60 "Notices of Violation" as specified in the settlement agreement with the Department of Environmental Protection.

Public Purpose: Compliance with regulatory enforcement action by DEP (s.403.121, F.S.).

Performance Measure: Number of projects completed.

Policy 5E.4.1: The County will continue to work toward completion of projects intended to correct the 60 Notices of Violation.

Objective 5E.5: Continue implementation of a major maintenance program including replacement of failed pipes, repair of existing treatment facilities, and clean-outs to promote maximum efficiency of existing conveyances.

Public Purpose: Maximize the performance and use of existing facilities as an alternative to new construction [s. 187.210 (18), F.S.].

Performance Measure: Number of projects completed.

Policy 5E.5.1: The County will increase maintenance efforts so as to maximize the efficiency of existing stormwater facilities.

Objective 5E.6: Upgrade dilapidated or substandard roadway drainage/treatment facilities.

Public Purpose: Improve stormwater management through upgrade of stormwater facilities [s.187.201 (8), 373.016, F.S.].

Performance Measure: Number of projects completed using the basin approach.

Policy 5E.6.1: The County will upgrade stormwater drainage/treatment facilities as part of any County road re-paving or construction project. Where possible, this will be conducted with a drainage basin perspective as described in Policy 5A.12.1.

Objective 5E.7: Protect property and prevent pollution through specific provisions in the Land Development Regulations for the regulation of stormwater runoff.

Public Purpose: Prevent stormwater pollution of surface waters and reduce the potential for flooding adjacent properties [s.187.201(8), 403.021, 373.016, F.S.].

Performance Measure: Whether or not such provisions protect water quality and prevent stormwater flooding in new developments during a 25-year storm event.

Policy 5E.7.1: Stormwater runoff shall be no greater after a development project than before the project as outlined in the FDOT Drainage Manual.

Policy 5E.7.2: The following general guidelines and principles are State standards and will be used as the basis for stormwater management:

(1) Prohibit the unauthorized obstruction of natural or man-made drainageways.

- (2) Require sediment control as part of any land clearing or development project, except for bona-fide agricultural activities using approved Best Management Practices (BMP's).
- (3) Provide for the dedication or private maintenance of all stormwater facilities, conveyances, or easements.
- (4) Specific standards and criteria for impervious surface, lot coverage, and minimum open space areas are included in the Land Development Regulations.
- (5) Bridges, culverts, pipes, ditches or other conveyances shall be designed and constructed to County standards.
- (6) Require evaluation of flooding that may be caused by the development of vacant land adjacent to existing developed areas, including adjacent building lots in subdivisions.
- (7) Require that best engineering practices be used for the design and construction of stormwater control facilities based on the following level-ofservice standards.

(a) Water Quality

- (i) Outstanding Florida Water; Potable Water Supply: For stormwater discharges into OFW or the Deer Point Reservoir Protection Zone treatment shall be as specified in s.62-4.242(2) & (3), FAC (OFW standards) and ERP Applicant's Handbook Volume II Part IV, paragraph 8.12.
- (ii) Other Discharges: For all other stormwater discharges treatment shall be as specified in Ch. 62-25, FAC.
- (iii) <u>Ecosystem Management Zones</u>: Treatment to OFW standards is required for areas within designated Ecosystem Management Areas.

(b) Flood Attenuation

For purposes of flood attenuation all development projects shall be designed and constructed so as to accommodate at a minimum the 25-year critical duration storm event as outlined in the FDOT Drainage Manual or the 100-year critical duration storm event in identified critical basins.

Consistent with state law, this requirement shall not apply to the construction of single-family, duplex, triplex, or quadraplex dwellings and customary accessory uses.

(c) Operation and Maintenance

Once identified, all stormwater facilities and conveyances owned and operated by the County, and once identified and inventoried as County owned, shall be assigned the following levels-of-service (LOS):

LOS - Operation and Maintenance (O&M)

- A Routine Maintenance.
- B Routine inspection with specific routine maintenance.
- C Routine inspection with inspection-based O&M.
- D Reaction/complaint based O&M.
- E No service.

At the present time, all facilities and conveyances are categorized as level D.

All County owned stormwater facilities and conveyances shall be identified as County maintained in a GIS data base.

Once identified, the minimum level of service will be C.

- (8) Prohibit evacuation-intensive facilities (e.g. hospitals, nursing homes, etc.) in "A" and "V" flood zones.
- (9) Require developers to construct stormwater facilities and conveyances at their own expense as part of any new development project.
- (10) Provide exemptions from County stormwater regulations consistent with Ch. 62-346, FAC.

Objective 5E.8: Continue eligibility for and participation in the National Flood Insurance Program (NFIP).

Public Purpose: Protect public and private property from the effects of flooding [s.187.201(7), 373.016, F.S.].

Performance Measure: Continued participation in the NFIP. Number of projects built to federal flood damage prevention standards.

Policy 5E.8.1: The County will continue participation in the NFIP and will use its Flood Damage Prevention Ordinance and the policies listed below to reduce the potential for flooding.

Policy 5E.8.2: Flood zones in Bay County will be as shown on Flood Insurance Rate Maps published by the Federal Emergency Management Agency.

Policy 5E.8.3: The County will use its Local Hazard Mitigation Strategy (LHMS), to reduce the potential for flood damage.

Performance Measure: The extent to which recommendations set forth in the LHMS are implemented.

Policy 5E.8.4: The County will use its Flood Damage Prevention Ordinance to ensure that structures built in flood zones are properly elevated and constructed so as to reduce the risk of flood damage.

Performance Measure: Continued enforcement of the Flood Damage Prevention Ordinance and the current building code, so as to provide for ongoing participation in the National Flood Insurance Program.

Objective 5E.9: Ensure that State water quality standards are maintained or improved as a result of the County's stormwater management programs.

Public Purpose: Maintain or improve water quality in waters of the state [s.187.201(8), 403.021,F.S.].

Performance Measure: Maintenance or improvement in water quality as determined by routine monitoring.

Policy 5E.9.1: The County will not permit any new development that will cause degradation of State water quality standards.

Objective 5E.10: Augment or supplant County funds for stormwater management through use of federal, state, or regional grants, low-interest loans, appropriations, or other available external funding sources.

Public Purpose: Provide funding for stormwater management programs and projects (s.403.0893,F.S.).

Performance Measure: Amount of external funds obtained.

Policy 5E.10.1: The County will pursue all available external funding sources for stormwater plans, projects and programs.

Objective 5E.11: Continue to maintain a dedicated source of revenue to fund stormwater/drainage plans, programs, and projects.

Performance Measure: Continued maintenance of the Storm Water Utility as a source of funding.

Policy 5E.11.1: The County will pursue the use of special assessment, Municipal Service Benefit Unit (MSBU), or other similar source of dedicated funds to pay for stormwater plans, programs, and projects, in addition to the stormwater utility fee.